# Determination of Public Land (Rangeland) Health for 64062 2 C SLASH RANCH

The Record of Decision (ROD) for the New Mexico Standards for Public Land Health and Guidelines for Livestock Grazing Management (dated January 2001) adopted three Standards for Public Land Health. These are (1) Upland Sites Standard, (2) Biotic Communities, Including Native, Threatened, Endangered, and Special Status Species Standard and (3) Riparian Sites Standard.

The ROD also established a process for the BLM Field Offices for the implementation. Through a public participation process, the Roswell Field Office developed and adopted indicators to use in conjunction with existing monitoring data to assess these standards.

Field assessment worksheets and other available data that evaluate the local indicators were completed for this allotment. Based on the assessments, it is my determination that the public land within the 2C Slash allotment #64062 meets the Upland Sites standard and (2) Biotic Communities, including Native, Threatened, Endangered, and Special Status Species standard. There are no public land Riparian areas on this allotment, therefore this standard will not be addressed.

/s/ T. R. KREAGER
Assistant Field Manager

09/20/2004

Date

### Standards of Public Land Health Evaluation of 64062 2 C SLASH RANCH Allotment [ 08/06/2004 ]

The Roswell Field Office conducted rangeland health assessments attwo (2) study sites within the 2C Slash Ranch allotment #64062. The assessments looked at the Soil/Site Stability, Hydrologic Function and Biotic Integrity indicators within the vicinity of each study site. Existing monitoring data was incorporated into and in support of the field assessment. The summary of each assessment is attached and shown in the following table.

Study Area or		UPLAND		BIOTIC		F	RIPARIAN	
Assessment Area	Meets	Monitor an Indicator	Meets	Monitor an Indicator	Not	Meets	Monitor an Indicator	Does Not Meet
64062-NORTH- E102 (*)	X		X			N/A		
64062- SOUTHWEST- E103	X		X			N/A		

Twenty-two (22) indicators for Rangeland Health were evaluated for the public land on the 2C Slash Ranch allotment #64062. Ten (10) of these assessed soil site stability, 11 hydrologic function and 13 biotic integrity. These qualitative assessments in conjuntion with quantitaive information gathered from previous data collected on 2 trend plot locations within the allotment were utilized to make rangeland health determinations. Quantitative evaluations are performed by the Roswell Field Office include some or all of the following: ground and vegetative cover and composition, production, frequency, and ecological condition. These collections which were initiated in the late 1970's/early 1980's are scheduled and conducted approximately every 5 years.

North Pasture has experienced drought effects over the last several years. This SD-3 Shallow ecological site encompasses 3,054 acres/1388 hectares. The soil phase is a (Lr)-Lozier-Reakor complex which occurs on low limestone hills west of Roswell with 1-9 percent slopes at elevations of 3,900 ft/1181 m to 4,200 ft/1272 m. No livestock were present at the time of the evaluation. However, numerous pronghorn (Antilocapra americana) were observed along the two-track abutting the fenceline leading to the site. Currently the public land in the abandoned Hondo Reservoir where the site is located is fenced off and access was obtained by foot eastward towards the Old Channel drainage.

Indicators for the North Pasture, with soil and hydrologic attributes of concern are rills, water flow patterns, pedestals and/or terracettes, and litter movement. These all rated Moderate. There is slight active rill formation especially in the exposed areas and

interspaces. Erosion is minor as the water flow patterns are quite evident with some instability and deposition. In these exposed areas is where the pedestaling is occuring on clumps of grass, most notably pappusgrass (Enneapogon desvauxii) and blue grama (Bouteloua gracilis). There is some pedestaling occurring on a few shrubs as these taprooting plants such as snakeweed (Gutierrezia sarothrae) and javelinabush (Condalia spp.) are slightly elevated from ground level. Litter is moving and piling up against obstructions and settling in a few low depressional areas. This appears to be attributed to the recent thunderstorm activity which has possibly moved the materials by water flow. Bareground rates Moderate to Extreme, with estimates consistently at 70% exceeding the upper end of the range expected and the long-term average of 23 percent. Functional'structural groups have been modified from that expected. Athough blue grama and black grama (Bouteloua eriopoda) are onsite, their dominance has been reduced. This may only be short term, as the annual, Russian thistle (Salsola iberica) has infested this upland site and is using the dead grass clumps as points of germination and/or propogation. This is undoubtedly due to southwesterly winds bringing in the seed source. Annual production is approximately 1/3 of the potential and rates Moderate. Both physical and biological crusts are onsite but are experiencing breaks in continuity.

The Southwest Pasture site is located on the boundary line between the Two Rivers flood control project administered by the Army Corps of Engineers and the fence on the 2C Slash Ranch. This SD-3 Shallow ecological site encompasses 1,286 acres/585 hectares on a (Lt)-Lozier-Tencee soil complex which mostly occurs in the west-central part of the survey area on low, limestone and indurated caliche hills with 1-9 percent slopes. Elevations range from 3900 ft/1182 m to 4,200 ft/1273 m. Indicators of concern rating Moderate are bareground, soil surface loss or degradation, soil surface resistance to erosion, functional/structural groups, annual production and invasive plants. Bareground is currently estimated at 60-70%. This is right at the upper end of the range expected for the ESD and exceeds the long-term average of 33.5 percent. The soil site stability test resulted in rapid melting of the interspace soil sample but not so readily for the under the canopy sample. Organic matter is somewhat greater under the canopy. There has been some soil surface loss as soil degradation has occured with a reduction in organic matter. The functional/structural groups is missing the dropseed (Sporobolus spp.), sideoats grama (Bouteloua curtipendula) and threeawn (Aristida spp.) component. The annual forb Russian thistle has taken over the site and makes up most of the ground cover along with bareground and some perennials. Annual production is now estimated at 300 lbs/ac or kg/ha. This is 40% of the potential is significantly less than the long term average. Invasive plants is primarily mesquite (Prosopis glandulosa) scatterd throughout. There is an occasional catclaw (Acacia spp.) with cholla (Opuntia spinosa) present. There is some weak physical crusting with very little organic matter and litter present. There exists no real mulch layer, but blue grama and black grama are observed sprouting from in between the thistle and from the pre-exiting decadent grass clumps. Plants like lambsquarter (Chenopodia spp.), ground cherry (Physalis spp.), globemallow (Sphaeralcea spp.) and zinnia (Zinnia spp.) occur in abundance along the road and surrounding area. Pronghorn and mule deer (Odocoileus hemionus) frequent the area and were observed traversing the hillsides.

Hydrology - Pasture North - The rills indicator rated as moderate. Active rill formation is occurring on upslope and exposed areas. The water flow patterns indicator rated as moderate. Erosion is occurring with some instability and deposition. The pedestals and/or terracette indicator rated as moderate. The recent dry conditions in combination with wind and water erosion has possibly decreased the amount of plant cover and possibly decreased infiltration into the soil which may have increased the amount of pedestaling of plants and rocks. The litter movement indicator rated in the moderate category. The decrease in litter movement suggests that the dry conditions have had a negative affect on the growing conditions which decreases the amount of litter that is produced and movement. All other indicators rated as none to slight or slight to moderate. Sand and gravel deposits of Quaternary alluvial deposits outcrop in the area. Limestone deposits of the San Andres Formation outcrop in the area.

Pasture Southwest - The bareground indicator rated as moderate. The amount of bareground has possibly increased due to recent dry conditions and also wind and water erosion processes. Soil surface resistance to erosion rated in the moderate category. Organic matter is lacking on this site, but this is expected for an area that has a small amount of litter present. The soil surface loss or degradation has rated out as moderate. The recent dry conditions have decreased the strength of physical crusts and or absence of soil crusts, wind velocity, surface dryness, and the decreased amount of surface plant cover has possibly increased soil surface loss to degradation. Sand and gravel deposits of Quaternary alluvial deposits outcrop in the area. Limestone deposits of the San Andres Formation outcrop in the area.

Wildlife - Evaluation of the integrity of the biotic community considered several indicators as attribute indices for the area of interest. Biotic indicators are interrelated with several other indicators, including soil/site stability, hydrologic function, and vegetation. Several indicators are singularly biotic and address the vegetative aspect of the ecological site description, such as functional/structural groups and plant mortality & decadence, as discussed above. In addition to the standard worksheet biotic factors, four specific wildlife indicators and descriptors are included in this evaluation.

North Pasture - Considering present climate regimes, annual production should be be expected to fall within the normal range of variability and rated as Moderate. All other biotic indicators are rated Slight to Moderate. Currently, production is being estimated as one-third of the potential production. Similar sites in the general area reflect very good range condition considering the drought conditions that has prevailed over several years. There appears to be a downward trend in ecological condition for this pasture based on range trend photographs.

Wildlife Habitat is rated Moderate, primarily for pronghorn and a variety of non-game terrestrial species due to the decreased annual production. Wildlife Population is rated as Slight to Moderate as pronghorn are able to move to more favorable sites.

Southwest Pasture - Three biotic indicators fell within the Moderate rating; functional/structural groups, annual production and invasive plants. The Wildlife Habitat

indicator also rated as Moderate and follows the other biotic indicator ratings. There appears to abe a downward trend in ecological condition for this pasture as well.

With respect to Special Status Species, none are known to occur in the area of interest at this time and the Habitat and Population indicators are, therefore, rated None to Slight.

It is the professional opinion of the Assessment Team that the public land within the 2C Slash Ranch allotment meets the Upland and Biotic standards. There are no Riparian issues present, therefore this standard was not addressed. See site notes and recommendations for further information regarding the assessments on this allotment.

The (\*) indicates that the assessment had one or more indicator(s) rated moderate/extreme or extreme. These indicators are:

#### Bare Ground

These indicators by themselves are not enough to rate the site as not meeting a standard but may warrant future monitoring.

**Recommendations:** Regular scheduled monitoring should continue on the two sites. Despite recent drought conditions, the majority of indicators fall within the normal range of variability. A more in depth evaluation should be done to better establish the boundary fences, since some have been rebuilt and others abandoned. The Hondo Reservoir area where the North site is located especially needs the fences plotted in to represent the true allotment boundary and public versus private land parcels.

Wildlife - This allotment contains two large tracts of public land previously affected by past watershed protection projects and are essentially islands of public land surrounded by private lands. Consider segregating the public lands from the private lands and implement a grazing system that will allow to yearlong rest to recover and reverse the apparent downward trend.

RFOs	Upland a	and Biotic Standa	rd Ass	sessment S	ummary	Worksh	eet
		SITE 64062	2-NOR	TH-E102			
Legal L	and Desc	NESE 25 0110S 022 Meridian 23	IESE 25 0110S 0220E Iferidian 23 Acreage		ge 3054		
	Ecosite	042CY025NM SHALLOW SD-3				n Y	
V	Vatershed	13060008090 HONI	DO				
	Observers	NAVARRO/MCGE	Е	Obse	rvation Dat	e 08/06/2	004
County So	oil Survey	NM666 CHAVES SOUTH		Soi	l Var/Taxa	d	
Soil	Map Unit	Lr		Soil 7	Taxon Nam	e LOZIE	R
Text	ture Class	NM666 GRV-L			Soil Phas	LOZIE REAK	
Texture	Modifier	NM666 COBBLY I	OAM				
Obse Annual Pre	erved Avg ecipitation			Observed A Season I	vg Growin Precipitatio	<b>∪</b>	
	A Annual cipitation		7.37		AA Growin Precipitatio	<b>-</b>	5.24
NOAA Av Pre	g Annual ecipitation		11.99		vg Growin Precipitatio	- II	9.8
	ances and imal Use:						
Part 2. Att	ributes an	d Indicators					
				ture from Eco ption/Ecolog	_		S
Attribute	Indicator	S	Extre	m Moderat e to	Moderat	Slight to Moderat	None to
				Extreme		e	Slight
S H	Rills				X		
Comments					11		
SH	Water Flo	ow Patterns			X		
Comments :							
SH	Pedestals	and/or Terracettes			X		
Comments :	Pedestali	ng on dead grass clur	nps is c	quite evident.			

SH	Bare Ground		X			
Comments :	70% is the current estimate.					
SH	Gullies				X	
Comments :						
S	Wind-scoured, Blowouts, and/or Deposition Areas				X	
Comments :						
Н	Litter Movement			X		
Comments :	Displacement with scatterings	around o	bstructions	and depre	essions.	
SHB	Soil Surface Resistance to Erosion				X	
Comments :						
SHB	Soil Surface Loss or Degradation				X	
Comments :						
Н	Plant Community Composition and Distribution Relative to Infiltration and Runoff				X	
Comments :						
SHB	Compaction Layer					X
Comments :						
В	Functional/Structural Groups				X	
Comments :						
В	Plant Mortality/Decadence				X	
Comments :	Mostly on dead grass clumps.					
НВ	Litter Amount				X	
Comments :	Less than 10%					

В	Annual Production			X		
Comments :	1/2 of the ESD.					
В	Invasive Plants				X	
Comments :	Mesquite and creosote less that	ın scattere	ed, with Ru	ıssian thist	le infesting	g.
В	Reproductive Capability of Perennial Plants					X
Comments :						
S	Physical/Chemical/Biologica l Crusts				X	
Comments :	Physical and bilogical.					
В	Wildlife Habitat			X		
Comments :	Low rolling hills grassland hal Reservoir and access is limited habitat condition due to recent	d. Area ap	pears to ex	khibit a do		
В	Wildlife Populations				X	
Comments :	No specific wildlife population relatively abundant in the area populations.					
В	Special Status Species Habitat					X
Comments :	None known to occur.					
В	Special Status Species Populations					X
Comments :	None known to occur.					
Part 3. Sun	nmary					
attributes be	Summary - Each of the indicated with Standard Attributes.					
Standard Attribute		Extrem	Moderat e to Extreme	Moderat e	Slight to Moderat	None to Slight

S	Soil	0	1	3	5	1
Н	Hydrologic	0	1	4	5	1
В	Biotic	0	0	2	7	4

B. Attribute Summary. In this table, the Extreme and Extreme to Moderate columns in the table above are merged for the *Does not Meet* column, Moderate becomes *May Need More Info*, and Slight to Moderate and None to Slight merge to form the *Meets* columns. Values from the table are summarized below. Space is provided for rationale of the determination. This space should most certainly be used when the determination by the ID team conflicts with the summarized values. Provide the sources of information that lead to the determination. X out the appropriate box for each attribute to denote final agreed upon determination by the ID team.

Attribute	Rationale	Does Not Meet	May Need More Info	Meet
Soil	Soil attributes remain within the normal range of variability. Only a few deviations should exist due to the nature of this shallow site.	1	3	6
	Hydrological attributes still are within the normal range of variability. Only a few deviations should exist due to the nature of this shallow site.	1	4	6
Biotic	The biotics are within range with very minor deviations.	0	2	11

Site Notes: The site has been land-locked with past fencing abandoned and the old reservoir boundaries redefined. Russian thistle has infested and is using the dead grass clumps as resource islands for establishment. The grama grasses along with pappus grass remain.

RFOs	Upland	and Biotic Standa	rd As	sessment S	ummary \	Worksh	eet	
		SITE 64062-SC	OUTH	IWEST-E1	03			
Legal La	and Desc	NWNW 10 0120S 02 Meridian 23	220E	Acreage		1286		
	Ecosite	042CY025NM SHALLOW SD-3			Photo Taker	n Y		
W	atershed	13060008090 HOND	Ю					
О	bservers	NAVARRO/SPAIN		Obser	rvation Date	08/20/2	004	
County Soi	1 Survey	NM666 CHAVES SO	DUTH	Soi	1 Var/Taxao	1		
Soil N	Map Unit	Lt		Soil 7	Taxon Name	LOZIEI	R	
Textu	ıre Class	NM666 GRV-L			Soil Phase	LOZIEI		
Texture 1	Modifier	NM666 COBBLY LO	DAM					
	ved Avg Annual cipitation			Annual Observed A		vg Growing Precipitation	·	
	Annual cipitation		7.37	NOAA Grov	wing Seasor Precipitation		5.24	
NOAA Avg	g Annual eipitation		11.99		vg Growing Precipitation		9.8	
		The only disturbance recreation area and the					<b>)</b>	
Part 2. Attı	ributes a	nd Indicators						
				ture from Eco ption/Ecolog			1	
Attribute	Indicator	rs	Extre	m Moderat e to Extreme	Moderat e	Slight to Moderat e	None to Slight	
S H	Rills						X	
Comments :								
SH	Water F	low Patterns				X		
Comments :								
SH	Pedestal	s and/or Terracettes				X		
Comments	On some	e grass clumps.						

S H	Bare Ground X	
Comments	Now estimated at 60-70%.	
SH	Gullies	ζ
Comments :		
S	Wind-scoured, Blowouts, and/or Deposition Areas	ζ
Comments :		
Н	Litter Movement X	
Comments :		
SHB	Soil Surface Resistance to Erosion	
Comments :		
SHB	Soil Surface Loss or Degradation	
Comments :	Some small rock has migrated towards the surface.	
Н	Plant Community Composition and Distribution Relative to Infiltration and Runoff	
Comments :		
SHB	Compaction Layer X	ζ
Comments :		
В	Functional/Structural Groups X	
Comments :	Absence of threeawn and dropseed. Annual forb Russian thistle has taken over the site.	
В	Plant Mortality/Decadence X	ζ
Comments :		
НВ	Litter Amount X	
Comments	Now estimated at 5-10%. Very little previous season's growth.	

:						
В	Annual Production			X		
Comments :	Now estimated at 40% of pote	ntial.				
В	Invasive Plants			X		
Comments :	Mesquite scattered.					
В	Reproductive Capability of Perennial Plants					X
Comments :						
S	Physical/Chemical/Biologica l Crusts				X	
Comments :	Physical crusts evident.					
В	Wildlife Habitat			X		
Comments:	Low rolling hills grassland had Rivers Reservoir and access is trend in habitat condition due	limited.	Area appea	ars to exhib		
В	Wildlife Populations				X	
Comments:	No specific wildlife population relatively abundant in the area populations. Other species of a game birds.	. Current	habitat cor	nditions lin	niting pron	ghorn
В	Special Status Species Habitat					X
Comments :	None known to occur.					
В	Special Status Species Populations					X
Comments :	None known to occur.					
Part 3. Sun	nmary					
attributes be	r Summary - Each of the indica elow. An indicator is placed in Standard Attributes.					
Standard		Extrem	Moderat	Moderat	Slight to	None

Attribute		e	e to	e	Moderat	to
			Extreme		e	Slight
S	Soil	0	0	3	3	4
Н	Hydrologic	0	0	3	5	3
В	Biotic	0	0	6	2	5
	1					

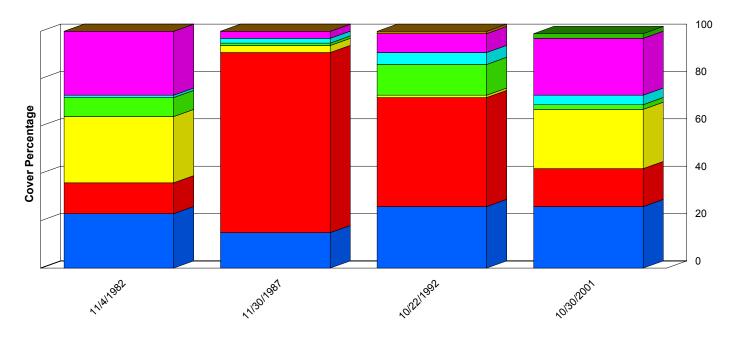
B. Attribute Summary. In this table, the Extreme and Extreme to Moderate columns in the table above are merged for the *Does not Meet* column, Moderate becomes *May Need More Info*, and Slight to Moderate and None to Slight merge to form the *Meets* columns. Values from the table are summarized below. Space is provided for rationale of the determination. This space should most certainly be used when the determination by the ID team conflicts with the summarized values. Provide the sources of information that lead to the determination. X out the appropriate box for each attribute to denote final agreed upon determination by the ID team.

Attribute	Rationale	Does Not Meet	May Need More Info	Meet
Soil		0	3	7
Hydrologic		0	3	8
Biotic		0	6	7

Site Notes: This shallow site is located on the Two Rivers Dam flood control project next to the boundary line between 2C Slash ranch and the project. US Army Corps pf Engineers built this structure in 1963 to control flooding from major rain events. This project protects the city of Roswell from flooding and sediment from the Rio Hondo and Rocky Arroyo. The entire area is surrounded by private land. An ongoing schedule of monitoring has continued on this study though.

At the time of assessment, the site has been taken over by Russian thisle. A few of the dead grass clumps have shown some signs of life as blue and black grama sprouts are shooting from them with seed heads of their own.

## **Ground Cover Trends**



Forb Tree SROCK Shrub LROCK LITTER Grass BGROUND
--

	11/4/1982	11/30/1987	10/22/1992	10/30/2001
BGROUND	23.00	15.00	26.00	26.00
Forb	0.00	0.00	0.00	2.00
Grass	13.00	76.00	46.00	16.00
LITTER	28.00	3.00	1.00	25.00
LROCK	8.00	1.00	13.00	2.00
Shrub	1.00	2.00	5.00	4.00
SROCK	27.00	3.00	8.00	24.00

	11/4/1982	11/30/1987	10/22/1992	10/30/2001
Tree	0.00	0.00	1.00	0.00
Total	100.00	100.00	100.00	99.00

#### **Report Parameters**

SITE NAME LIKE 64062-NORTH-E102

ON/AFTER 10/01/1981 ON/BEFORE 09/30/2002

### **Functional / Structural Groups**

#### **Report Parameters**

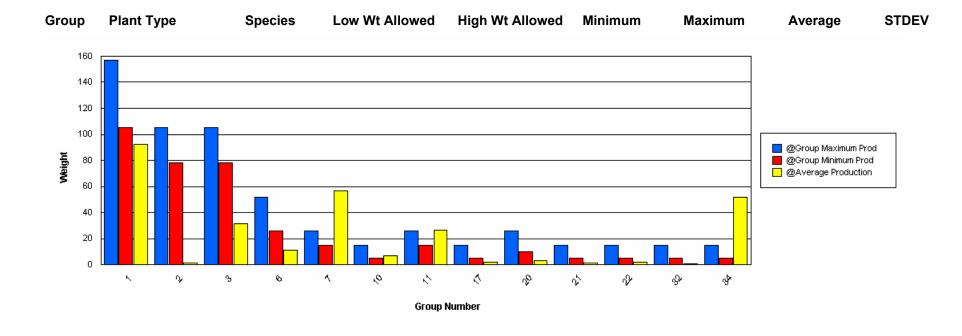
SITE NAME LIKE 64062-NORTH-E102

ON/AFTER 10/01/1981 ON/BEFORE 09/30/2002

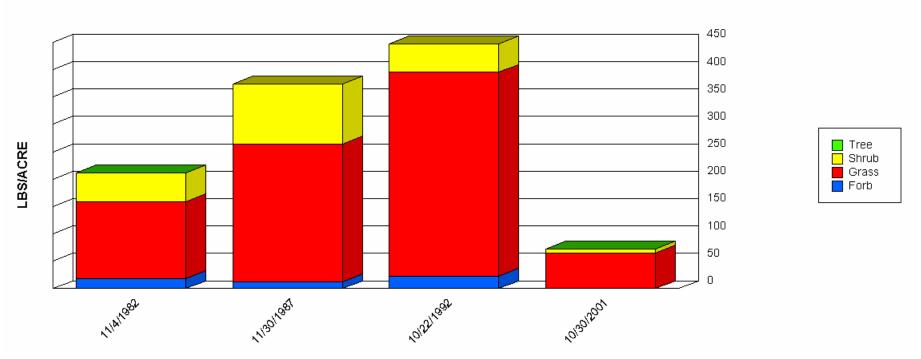
MIN LBS TO GRAPH 1

SELECTED ECOSITE 042CY025NM

Group	Plant Type	Species	Low Wt Allowed	High Wt Allowed	Minimum	Maximum	Average	STDEV
1	Grass	BOER4	105	157	20.00	170.00	92.25	58.15
2	Grass	BOCU	78	105	0.00	4.00	1.67	1.70
3	Grass	BOGR2	78	105	12.00	45.00	31.50	12.66
6	Grass	SPCR	26	52	4.00	22.00	11.33	7.72
7	Grass	TRMU	15	26	0.00	20.00	8.00	8.64
7	Grass	TRPI2	15	26	8.00	124.00	48.67	53.32
10	Grass	ERPU8	5	15	0.00	18.00	6.67	8.06
11	Grass	ARIST	15	26	2.00	17.00	9.00	6.16
11	Grass	HIMU2	15	26	0.00	7.00	3.50	3.50
11	Grass	MUAR2	15	26	0.00	26.00	13.33	10.62
11	Grass	SCBR2	15	26	0.00	1.00	0.50	0.50
17	Forb	SPHAE	5	15	0.00	3.00	2.00	1.41
20	Forb	CROTO	10	26	0.00	9.00	3.25	3.49
21	Forb	DYPA	5	15	0.00	3.00	1.50	1.50
22	Forb	HOGL2	5	15	0.00	0.00	0.00	0.00
22	Forb	PPFF	5	15	0.00	3.00	2.00	1.41
32	Shrub	OPUNT	5	15	0.00	2.00	1.00	1.00
34	Shrub	GUSA2	5	15	0.00	110.00	51.50	39.07
36	Tree	ACGR	5	15	0.00	1.00	0.50	0.50



### **Production Lbs/Acre Trends**



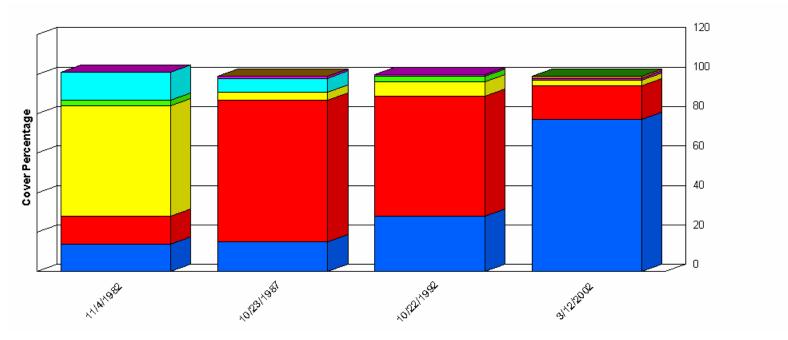
	11/4/1982	11/30/1987	10/22/1992	10/30/2001	
Forb	18.00	12.00	22.00	0.00	
Grass	141.00	252.00	373.00	65.00	
Shrub	52.00	110.00	52.00	7.00	
Tree	1.00	0.00	0.00	0.00	
Total	212.00	374.00	447.00	72.00	

#### **Report Parameters**

SITE NAME LIKE 64062-NORTH-E102

ON/AFTER 10/01/1981 ON/BEFORE 09/30/2002

### **Ground Cover Trends**



Forb
Shrub

Tree
SROCK
LROCK
LITTER
Grass
BGROUND

	11/4/1982	10/23/1987	10/22/1992	3/12/2002
BGROUND	14.00	15.00	28.00	77.00
Forb	0.00	0.00	0.00	0.00
Grass	14.00	72.00	61.00	17.00
LITTER	56.00	4.00	7.00	3.00
LROCK	3.00	0.00	3.00	0.00
Shrub	0.00	0.00	0.00	1.00
SROCK	14.00	7.00	0.00	0.00

	11/4/1982	10/23/1987	10/22/1992	3/12/2002
Tree	0.00	1.00	1.00	1.00
Total	101.00	99.00	100.00	99.00

#### **Report Parameters**

SITE NAME LIKE 64062-SOUTHWEST-E103

ON/AFTER 10/01/1981 ON/BEFORE 09/30/2002

### **Functional / Structural Groups**

**Report Parameters** 

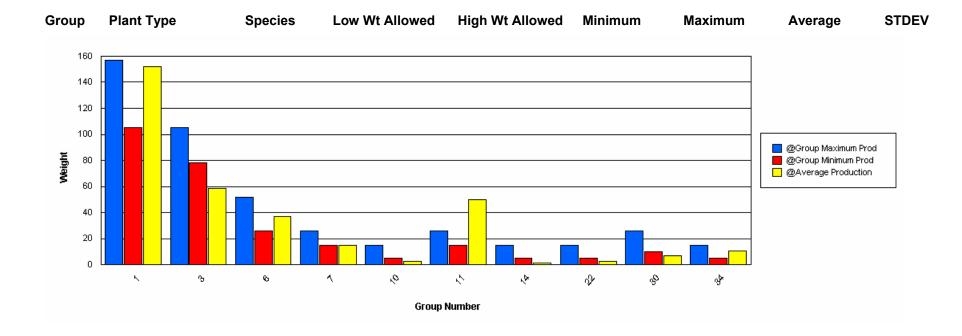
SITE NAME LIKE 64062-SOUTHWEST-E103

ON/AFTER 10/01/1981 ON/BEFORE 09/30/2002

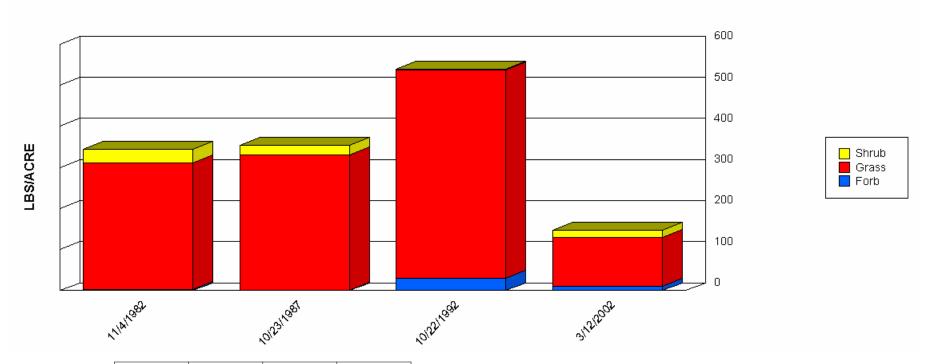
MIN LBS TO GRAPH 1

SELECTED ECOSITE 042CY025NM

Group	Plant Type	Species	Low Wt Allowed	High Wt Allowed	Minimum	Maximum	Average	STDEV
1	Grass	BOER4	105	157	90.00	282.00	152.00	77.64
3	Grass	BOGR2	78	105	18.00	97.00	58.75	31.66
6	Grass	SPCR	26	52	0.00	65.00	37.00	24.79
7	Grass	TRMU	15	26	0.00	27.00	15.00	11.77
10	Grass	ERPU8	5	15	0.00	6.00	2.67	2.49
11	Grass	ARIST	15	26	2.00	31.00	16.50	14.50
11	Grass	MUAR2	15	26	0.00	88.00	33.50	33.03
14	Grass	LYPH	5	15	0.00	3.00	1.50	1.50
20	Forb	CROTO	10	26	0.00	1.00	0.67	0.47
21	Forb	DYPA	5	15	0.00	1.00	0.50	0.50
22	Forb	PPFF	5	15	0.00	6.00	2.33	2.62
30	Shrub	PRGL2	10	26	4.00	11.00	7.00	2.94
34	Shrub	GUSA2	5	15	0.00	30.00	10.50	11.86



#### **Production Lbs/Acre Trends**



	11/4/1982	10/23/1987	10/22/1992	3/12/2002
Forb	3.00	1.00	31.00	10.00
Grass	308.00	329.00	506.00	119.00
Shrub	34.00	24.00	2.00	19.00
Total	345.00	354.00	539.00	148.00

#### **Report Parameters**

SITE NAME LIKE 64062-SOUTHWEST-E103

ON/AFTER 10/01/1981 ON/BEFORE 09/30/2002

